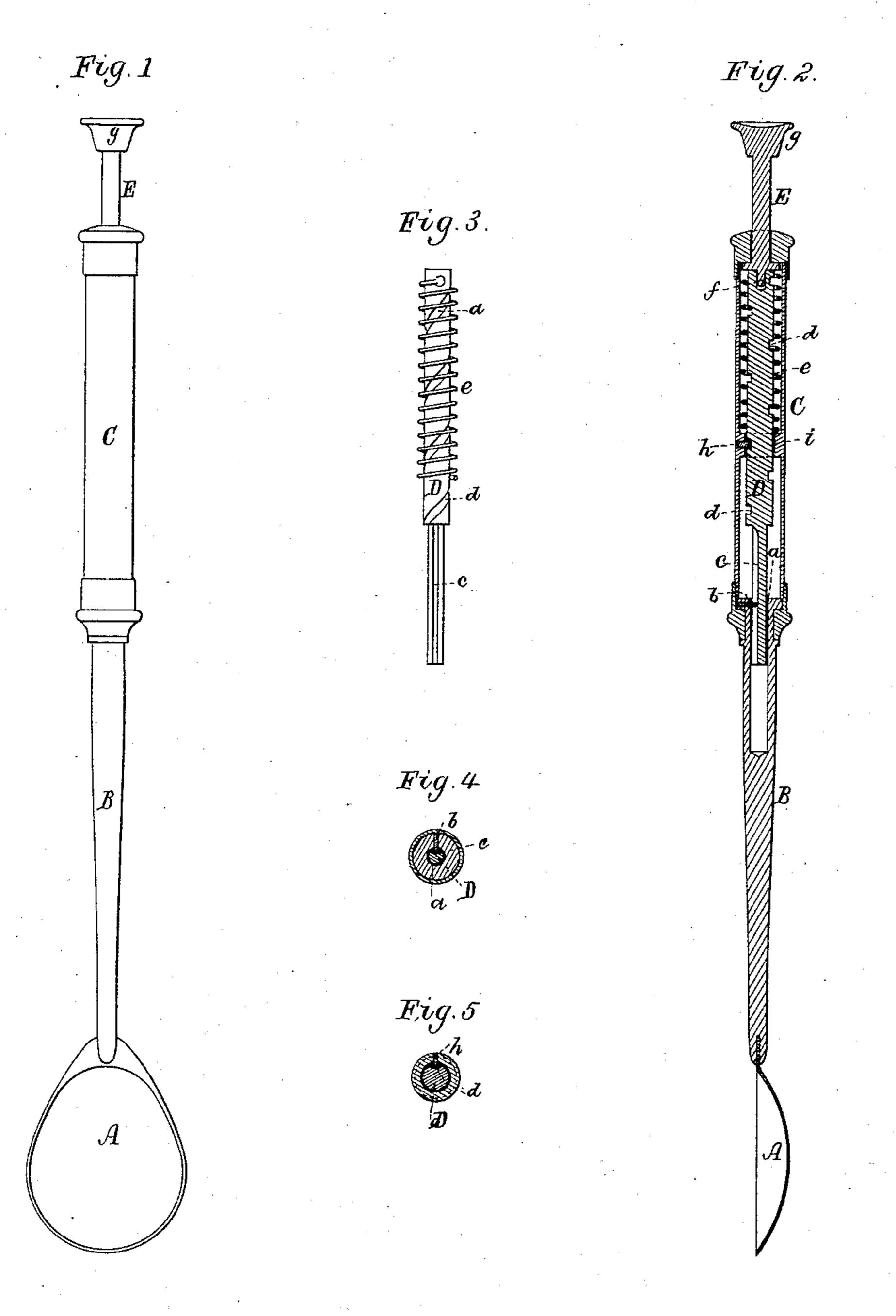
J. RIDER.

AGITATING SPOON.

No. 327,109.

Patented Sept. 29, 1885.



Witnesses. S. N. Poper Emer Blantt.

Inventor
John Rider.

by R. W. Lang atty

United States Patent Office.

JOHN RIDER, OF WATERTOWN, MASS., ASSIGNOR, BY MESNE ASSIGN-MENTS, TO HIMSELF AND ARTHUR LITCHFIELD, OF SAME PLACE.

AGITATING-SPOON.

SPECIFICATION forming part of Letters Patent No. 327,109, dated September 29, 1885.

Application filed June 22, 1885. (No model.)

To all whom it may concern:

Be it known that I, John Rider, of Watertown, in the county of Middlesex, of the Commonwealth of Massachusetts, have invented a 5 new and useful Improvement in Agitating-Spoons; and I do hereby declare the same to be described in the following specification, and represented in the accompanying drawings, of which—

Figure 1 is a side view; Fig. 2 a longitudinal section, of an agitating-spoon of my invention, the nature of which is defined in the claim hereinafter presented. Fig. 3 is a side view of the spirally-grooved rotator and its 15 spring, to be described. Fig. 4 is a transverse section of the bowl-shank, it being taken through the bore thereof. Fig. 5 is a transverse section of the handle taken through the stud that projects from the handle into the 20 spiral groove of the rotator.

In such drawings, A denotes the blade or This handle is tubular, and revolves freely on the shank, which is provided with a cylin-25 drical bore, a, that opens out of the rear end of the shank, there being within the bore and projecting from its periphery a small stud, b. (See Fig. 4.) This stud extends into a straight groove, c, made lengthwise in the rotator D, 30 extending within the bore of the shank. Besides this groove the rotator has within it, lengthwise of it, a spiral groove, d. Enveloping the rotator is a spiral spring, e, which at its rear end is fastened to the rotator.

The rotator, with its spring, is arranged concentrically within the handle C, and there butts against the rear end of the rotator an impeller, E, which is a rod provided at its inner end with a small journal, f, to enter the 40 rotator. At its outer end the impeller has a head or knob, g, fixed to it. The impeller is adapted to the rear end of the handle, so as to be able to slide freely lengthwise therein.

From the inner periphery of the handle a 45 stud, h, projects into the spiral groove of the rotator, there being around such stud and formed in the handle a shoulder, i, for the front end of the spiral spring to bear against. From the above it will be seen that when a

person may grasp the handle between the sec- 50 ond and third fingers of his hand he, with his thumb on the knob or head of the impeller, can press such impeller forward within the handle. In so doing he will simultaneously advance the rotator, which, while moving for- 55 ward, will be revolved one way by means of its spiral groove and the stud extending therein. In moving backward, which it will be caused to do by the spiral spring, the rotator will be revolved the opposite way. In re- 60 volving either way such rotator will simultaneously revolve the shank and blade or bowl of the spoon.

By pressing the impeller forward into the handle the spring will be contracted, so as to 65 force the impeller in the opposite direction, when the knob of the propeller is relieved of the pressure of the thumb, from which it will be evident that the reciprocating rectilinear movements so imparted to the impeller will 70 bowl, B its shank, and C the handle thereof. | be attended with like movements of the rotator, and simultaneous reciprocating rotary movements of the latter and the spoon blade or bowl, so that if at the time such blade or bowl be inserted in a quantity of liquid or 75 other matter or matters within a tumbler such liquid or matter or matters will be stirred or agitated, such being the purpose of the agitating spoon or device, as represented and described.

Instead of a concavo-convex bowl, a flat blade like that of a paddle may be employed; but I prefer the bowl, as in such cases it may be used as a spoon-bowl generally is employed.

I claim— The agitating spoon or device, substantially as described, consisting of the blade or bowl A, its tubular shank B, and its stud b, the tubular handle C, with its stud h and shoulder i, the rotator D, with its straight and spiral 90 grooves c and d, the spiral spring e, and the impeller E, all arranged and adapted to operate as set forth.

JOHN RIDER.

Witnesses:

R. H. Eddy, ERNEST B. PRATT.